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(54) Method of manufacturing an electro-optical device

(57) An object of the invention is to reduce the manufacturing cost of EL display devices and electronic devices incorporating the EL display devices.

An EL material is formed by printing in an active ma-

trix EL display device. Relief printing or screen printing may be used as the method of printing. Manufacturing steps of the EL layer is therefore simplified and reduction of manufacturing cost is devised.

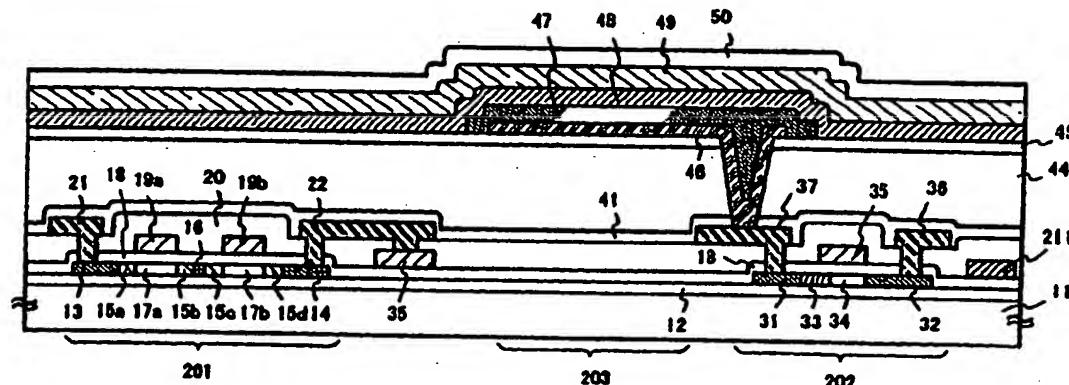


Fig. 2



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Application Number

EP 00 11 3587

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Place of search EPO FORM 163/03.02 (P00C11)	Date of completion of the search 3 March 2004	Examiner Faou, M	
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Application Number
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EUROPÄISCHE PATENTANMELDUNG

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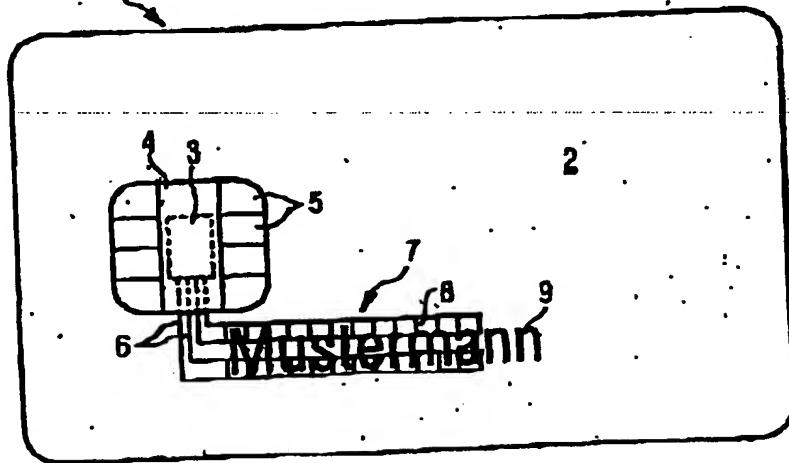
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(54) Chipkarte

(57) Die Erfindung betrifft eine Chipkarte mit einem externen Zusatz-Schaltkreis, ein Verfahren zur Aufbringung des Zusatz-Schaltkreises auf einer Chipkarte sowie ein Verfahren zur Verwendung des Zusatz-Schaltkreises beim Betrieb der Chipkarte. Bisherige Chipkarten erfüllen nicht hinreichend den Wunsch nach Sicherheit und Flexibilität. Die Erfindung stellt daher eine verbesserte Chipkarte zur Verfügung, die aufweist eine Trägerkarte (2) mit einer Oberfläche; und einem an der Trägerkarte angeordneten (2), integrierten Schaltkreis (3); wobei diese Chipkarte (1) gekennzeichnet ist durch zumindest einen auf der Oberfläche der Trägerkarte (2)

angeordnete Zusatz-Schaltkreis (7), der mit dem integrierten Schaltkreis (3) in elektrischer Verbindung steht und von dem integrierten Schaltkreis (3) lesbare Informationen enthält. Die lesbaren Informationen können ein Muster im Zusatz-Schaltkreis oder ein Programmcode sein. Das Muster kann dem Zusatz-Schaltkreis (7) beispielsweise während der Laserbeschriftung der Chipkarte eingebrannt werden. Der Programmcode kann in einem ROM des Zusatz-Speichers (7) gespeichert sein. Vorzugsweise wird der Zusatz-Schaltkreis (7) in Polymertechnologie mit Polymertransistoren implementiert, da diese sich einfach aufdrucken lässt.

FIG 1



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EP 1 103 916 A1

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(30) Priority: 28.09.1999 JP 27407999

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(54) LASER DRILLING METHOD AND LASER DRILLING DEVICE

(57) It is provided with a homogeneous optical system 13 for transforming laser light from a laser oscillator 10 into laser light having a linear cross-section and a drive mechanism for synchronously moving a mask 11 and a printed circuit board 12, an irradiation position of the linear laser light being fixed, the drive mechanism

moving the mask and the workpiece so that the mask passes through the irradiation position of the laser light while the moving direction thereof is perpendicular to the extending direction of the linear laser light so that the mask is scanned by the linear laser light, the drilling defined by the mask pattern thereby being carried out to the workpiece.

FIG. 1

